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and the great achievements in the history of cardiology. The account of the work of Harvey and his predecessors is particularly well done. One could wish that not so much had been said concerning the abnormal cardiac rhythms and more about the influence of scientific progress in increasing the effectiveness of ordinary clinical methods in diagnosis, prognosis and treatment.

C. C. W.

STUDIES IN DEFICIENCY DISEASE. ROBERT McCARRISON, M.D., D.Sc., Hox. LL.D. Fellow of the Royal College of Physicians, London; Laureat de l'Académie de Médecine, Paris; Honorary Surgeon to the Viceroy of India; Lieutenant-Colonel, Indian Medical Service. Pp. 270; 82 illustrations. London: Henry Frowde and Hodder and Stoughton, 1921.

Tucked away in the heart of the Himalaya Mountains twenty days' ride from the nearest railroad station, four days' ride from the nearest white person excepting the three white companions he had with him, McCarrison, in the face of these obvious difficulties, has been able to carry out a splendid piece of scientific research work. When one thinks of the many obstacles that had to be met in the nine years of intensive study that this work represents one would not be surprised if it lacked certain details, was incomplete, or was not sufficiently well worked out, but in going over the text one is surprised at the very great completeness of the work and the minuteness with which the studies are conducted from every point of view. McCarrison has studied the effect of deficiency in food on different types of animals, notably the pigeon and the monkey. He has deprived large numbers of them of the various vitamines and then he has studied not only the effect this has had, in a general way, on the animals but he has also studied very carefully and closely the gross morbid and microscopical pathology of the various organs of these animals. It is this phase of his work which is particularly interesting. He shows, for example, that there takes place an enlargement of the adrenal gland as the result of any type of food deficiency, whereas the other endocrine structures tend to atrophy. He shows by very careful weighing of the different endocrine organs just how great is the change in size of these organs on deficient diets and shows microscopically also the changes that take place. The same plan is followed with the gastro-intestinal tract and with the heart and blood-vascular system, as well as the nervous system. In addition to his experimental work McCarrison in the fourth part of his book deals with the practical application of his deficiency disease studies which he has made experimentally. In addition to the usual diseases which we classify as deficiency diseases; pellagra. beriberi, and so on probably the most interesting observation that

he has to make in connection with the practicability of his studies is the frequency with which deficiencies in the diet can produce gastro-intestinal disorders. This is certainly throwing a new light on some of these vague conditions of the alimentary tract with which we have to deal with in our ordinary civilized life, and which we have not been wont to consider the result of improper diet.

Dr. McCarrison's book is extremely interesting and very well written and will amply repay those who read it. It is not merely a dry recitation of a series of experiments but it is a vivid presentation of a large series of absorbing experiments which should appeal to medical men.

J. H. M., Jr.

The Spleen and Some of its Diseases. By Sir Berkeley Movnhan. Pp. 129; 13 illustrations. Philadelphia: W. B. Saunders Company, 1921.

SIR BERKELEY MOYNHAN, in 1920, delivered the Bradshaw Lecture of the Royal College of Surgeons of England, choosing as the subject of his address the surgery of the spleen and the diseases associated with a disordered spleen. He has now published this lecture as a small volume of 129 pages. The book represents a correlation of the surgery of this organ, as would be expected, with a discussion of the diseases which are associated with changes in the spleen. The volume can in no way be called a monograph, it is not sufficiently complete to warrant such a term, nor does the author apparently wish it to be considered as such, as the title of the book indicates in speaking of some of the diseases of the spleen. It can be recommended, therefore, as an interesting summary of our knowledge in part of some diseases presenting splenic pathology such as pernicious anemia, leukemia, Banti's disease, hemolytic jaundice, and other less important diseases. The book will be of value to those who are interested in diseases of the spleen but it cannot be considered as a reference book for those who are interested in the more abstruse and deeper problems of splenic diseases and the functions of the spleen. J. H. M., JR.

Orthopedic Surgeny of Injuries. By Various Authors. Edited by Sir Robert Jones, K.B.E., C.B., F.R.C.S., Director of Orthopedics, St. Thomas's Hospital; Consulting Orthopedic Surgeon, Royal Infirmary, Liverpool; Hon. Adviser to the Ministry of Pensions (Orthopedic Surgery). Pp. 1231; 474 illustrations. London: Oxford University Press, 1921.

THE advance of orthopedic surgery during the past war has been enormous, and it is, perhaps, the outstanding feature in surgical